

Application Serial No. 09/990,804
Amendment dated May 27, 2004
Reply to Office Action dated January 28, 2004

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

Claims 1-5 (cancelled).

Claim 6 (currently amended). ~~The Process~~ process according to claim 5, ~~characterized in that 21 wherein~~ the highly transmittive ~~glasses~~ glass types are Flint glass types with an Abbe coefficient of $v_d \leq 50$.

Claim 7 (currently amended). ~~The Process~~ process according to claim 21 ~~one of claims 5 to 6, characterized in that the~~ wherein feeding in of the highly pure glass raw materials occurs either in portions or continuously.

Claim 8 (currently amended). ~~The Process~~ process according to claim 21 ~~one of claims 5 to 7, characterized in that~~ wherein the temperature in the melt ~~bath~~ lies in the range of 1100° to 1380°C, ~~especially preferably in the range of 1280° to 1380°C.~~

Claim 9 (cancelled).

Claim 10 (currently amended). ~~The Process~~ process according to claim 21 ~~wherein agitation of the melt comprises one of claims 5 to 9, characterized in that the stirring occurs~~ at a rotation rate in the range of 30 to 100 rpm.

Claim 11 (currently amended). Use of ~~the~~ glass types produced by the process according to ~~one of claims 5 to 10~~ claim 21 for one or more of r-LCD for lens systems, ~~for~~ glass fibers and fiber reinforcers.

Claim 12 (cancelled).

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Claim 13 (cancelled).

Claim 14 (currently amended). The Process process according to claim 6, ~~characterized in that~~ wherein feeding-in of the highly pure glass raw materials occurs either in portions or continuously.

Claim 15 (currently amended). The Process process according to claim 6, ~~characterized in that~~ wherein the temperature in the melt ~~bath~~ lies in the range of 1100° to 1380°C, ~~especially preferably in the range of 1280° to 1380°C.~~

Claim 16 (currently amended). The Process process according to claim 7, ~~characterized in that~~ wherein the temperature in the melt ~~bath~~ lies in the range of 1100° to 1380°C, ~~especially preferably in the range of 1280° to 1380°C.~~

Claims 17-19 (cancelled).

Claim 20 (currently amended). The Process process according to claim 6, wherein agitation of the melt comprises ~~characterized in that~~ the stirring ~~occurs~~ at a rotation rate in the range of 30 to 100 rpm.

Claim 21 (new). A process for the production of glasses highly transmittive in the UV range by means of a melting process carried out in a melt tank in which there is a glass melt having a melt surface, comprising:

steadily feeding a well-homogenized mixture of highly pure glass raw materials of the highly transmittive glasses to be melted through a feed opening of the melt tank in such a manner that a closed mixture cover arises on the melt surface; supplying energy to the glass melt only below the melt surface without supplying energy to the melt surface or the space above the melt surface; and agitating the melt;

wherein material from the mixture resting on the melt surface is uniformly intermixed and sub-mixed into the melt, and wherein the space above the melt has a temperature in the range

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of 500°C to 700°C.

Claim 22 (new). The process according to Claim 21 wherein the temperature in the melt lies in the range of 1280°C to 1380°C.

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Amendments to the Drawings:

Please substitute Amended Figures 1 and 2. A marked-up drawing is submitted herewith wherein Figures 1 and 2 are now labeled "Prior Art".